

The SPIRIT of the WEST

Wonderful Development Since Dawn of Irrigation

By C. J. BLANCHARD
U. S. Reclamation Service



THE spirit of the west is optimism and progress. It is the spirit that fired the hearts of our forefathers who erected in the primeval forests of New England the superstructure of the greatest nation on earth. It is the optimism and faith which imbued their descendants who carved an agricultural richness from the Mississippi valley.

Once a wilderness so unpromising that it evoked derision in the halls of congress, the west has become today the land of fortune and opportunity. In this land of boundless distances the altitude is stimulating, the air is a tonic, giving health to those who have failed elsewhere. Its constant sunshine encourages optimism and cheerfulness. The glories of its opal-tinted dawns, the indescribable beauty of its sunsets and the nameless witchery of its twilight softly melting into night are the work of a divine painter.

There is a mental and spiritual uplift in its mountains, whose summits are in regions of perpetual snow. Its sapphire lakes, excellent in beauty those of Switzerland, open up a wondrous field of interest and pleasure to the sightseer and those in search of rest and recreation. The monarchs of its forests cast their shadows on the earth before the coming of the gentle Nazarene.

Its canons, sculptured during uncounted centuries by wind and wave, are unrivaled in their wonderful and varied coloring and in their awe-inspiring depths. Its deserts, in vastness of area, in potential wealth of soil and climate, and in rivers of constant supply, are sleeping empires awaiting exploitation and development. Here nature offers to every man his birthright—a wide sky, the sunshine, the wind, and a sure reward for intelligent effort. Here things are writ in characters too vast for human pen.

The late Gov. John A. Johnson well said the west symbolizes "homes for the homeless, food for the hungry, work for the unemployed, land for the landless, gold for the penniless, freedom for the enslaved, adventure for the restless, dangers for the brave, an unknown world to conquer, and room for all."

Irrigation has wrought its miracle and 13,000,000 acres reclaimed are annually producing harvests valued at more than \$250,000,000 and supporting in homes of their own more than 300,000 families. The wealth of that portion of the country which great statesmen in Webster's day were wont to declare worthless is greater now than that of the entire nation in 1850.

In the swift march of national events during the past decade, the development of the west has focused the attention of the world. It furnishes one of the most inspiring pages in the annals of our commonwealth. It is a story of progress and human achievement—a battle with nature in her sternest and most forbidding aspect.

Future writers will record the irrigation movement as an epoch in our history the far-reaching influence of which overshadowed in importance any other progressive movement since the opening to settlement of the Mississippi valley. The reclamation of vast areas of our arid and semi-arid regions, which is being promoted by the federal government and by large corporations working in conjunction with several states, is of profound economic importance to the nation.

The additional opportunities thus created for home makers are already serving to check the undesirable exodus of the country people to the city. Millions of acres of desert, untouched by rain and storing in its bosom the fertility gathered there by centuries of washings from hills and mountains, are being quickened by life-giving water.

Cities, populous and great, have sprung up; rural communities, attractive and prosperous, broad vistas of fertile fields and blossoming orchards whose yields are prolific beyond comparison, replace the wastes of sand and sage brush.

Economic forces are at work today in the country, and particularly in the arid west, which are gradually but surely shaping our agricultural development along new lines. In many parts of the irrigated country agriculture now occupies a position of greater dignity among the vocations than ever before. Its place among the scientific professions is now recognized and it is calling more strongly every day for the best talent and brains the nation affords.



GREATEST PROJECT OF THE RECLAMATION SERVICE, RIO GRANDE VALLEY, NEW MEXICO



LOOKING DOWN INTO JETON CANYON, YAKIMA PROJECT, WASHINGTON



FAMILIAR TYPE: THE OPTIMISTIC PROSPECTOR

The reclamation service began its work in 1902 on the passage of the reclamation act. The first contract was let in September of the next year and, on June 17, 1905, an important project in Nevada was formally opened.

Progress has been rapid and the activities of the bureau have been extended to 26 or more projects, which to date have involved the expenditure of \$60,000,000. In the seven and one-half years of its work the service has built 4,215 miles of canal. Placed end to end, these canals would reach from Washington to San Francisco and back to New Orleans. Several of these canals carry whole rivers.

It has excavated 17 miles of tunnels. Before the end of the year it will have completed four of the highest dams in the world. Its excavations of rock and earth amount to the enormous total of 60,000,000 cubic yards.

Its roads have a total length of 417 miles; telephones, 1,127 miles; levees, 70 miles.

It has purchased 315,751 barrels of cement and has manufactured in its own mill 340,000 barrels. As a result of its work water is available for 750,000 acres on 13,000 farms.

The gross value of crops produced on the lands irrigated by the government projects in 1910 was \$14,038,000. As a result of the work of the government it is estimated that land values have increased more than \$105,800,000.

The reclamation service is entering 1911 with money and plans for completing most of its larger and unfinished masonry structures and with about three-quarters of a million of acres of arid land under irrigation.

It will finish this year the great Roosevelt dam in Arizona, one of the most massive in the world. It has completed the Shoshone dam, in northern Wyoming, the highest structure of its kind ever built; the Pathfinder dam, in southern Wyoming; and the Laguna dam, in Arizona. It will for the first time utilize the Gunnison tunnel, whose completion was celebrated by President Taft last summer.

The funds available for construction are somewhat less than in previous years, and the organization, which is very elastic, has been cut down to fit reduced expenditures. About fifty skilled men—engineers, experts and technical assistants—have either sought private employment, have been transferred to other bureaus of the government or put on furlough, in order to keep the overhead charges consistent with the expenditures.

Reviewing the history of the reclamation service as a whole, its maximum activity and expenditures were in the year 1907. In 1902 the expenditures were less than \$100,000, and in 1903 less than \$1,000,000. In 1904 they were \$2,500,000; in 1905, \$5,000,000; in 1906, a little less than \$10,000,000; in 1907, nearly \$14,000,000. Then the expenditures decreased to \$10,000,000 in 1908, to about \$9,000,000 in 1909, and in 1910 they will be a little under \$8,000,000. It is expected that in 1911 they will shrink to about \$7,000,000, which sum will probably continue to be available during after years, assuming that the water-right charges are paid as they fall due.

This is the most critical period in the history of national irrigation since the passage of the reclamation act, in 1902. By public notices of the secretary of the interior, issued last year, hundreds of water-right installments, involving approximately \$1,000,000, became due on April 1, 1910. That date is a memorable one, not only to the settlers, whose entries are liable to cancellation for failure to make the payments due, but also to the reclamation service, which is concerned in securing the return of its investment in the engineering works. It is also a matter of interest to citizens of the number of sections containing feasible projects, the construction of which cannot be undertaken without additional funds. As the repayments are made through the local land offices and not directly to the service, some time must elapse before the actual amounts collected are known. On a number of the projects, like Sun River, Shoshone and Huntley, the settlers have already made their initial payments and will not be delinquent on the second installment until April, 1911, which enables them to market two crops between payments. On several other projects, such as the Minidoka, Klamath, Lower Yellowstone, Belle Fourche, Carlsbad, Truckee-Carson, North Platte and others, the first settlers have had the use of water for two crops, and it is probable that a majority will be able to meet their obligations without difficulty.

Detailed reports from various sources on each of the projects have been received at Washington. The conditions as a whole are described as favorable for a large return to the reclamation fund. On several of the projects there will be no delinquencies. On a number of projects the engineering work is not fully completed, but water is ready for large areas and is being supplied on a rental basis pending the announcement of the actual cost of water right. The reclamation service has derived considerable revenue from these sources and at the same time the farmers have been enabled to increase the areas in cultivation. The following financial statement is interesting as showing the status of the reclamation fund and the amounts which thus far have been credited to it through the operations of the reclamation service:

Total moneys received and transferred to the reclamation fund from sales of public lands under reclamation act to February 28, 1910, \$58,342,617.02. Approximately \$4,500,000 are still in the treasury of the United States, but not yet available.

Moneys received under operations of reclamation act from all sources in cash and credits, for work done, \$2,579,475.04, divided as follows: Town-land sales, \$103,673.91; miscellaneous

men of moderate means to secure homes in a prosperous and growing country.

Close to the Black Hills, in South Dakota, lies the beautiful valley of Belle Fourche, containing 100,000 acres of grass-covered prairie. Many miles of canals have been laid across this level surface, and what was only a short time ago the finest free cattle range in this country is rapidly becoming a compactly settled agricultural community.

An impressive engineering feature of this project is the Owl Creek dam, one of the longest and highest earthen embankments in the world. This structure, now nearing completion, is 6,200 feet long, has a maximum height of 115 feet and contains 1,600,000 cubic yards of material.

The Roosevelt dam, which is about completed as you read the story today, is in many respects the most remarkable structure of its kind in the world. Its towering height, 280 feet, its length on top, 1,080 feet, the inspiring scenery in which it is located and the enormous capacity of the reservoir created by it combine to make it one of the most stupendous engineering works of modern times.

Conceive, if you can, two valleys—one 12 miles, the other 15 miles in length, and each from one to three miles wide—transformed into a lake 200 feet deep in places and containing enough water to cover Delaware a foot deep.

The Salt River reservoir, when full, has a capacity sufficient to fill a canal 300 feet wide and 19 feet deep extending from Chicago to San Francisco.

My one regret is that the space allotted me is too little to permit me to describe the charms and advantages of other projects of the government. I should like to tell you of the opportunities on the Klamath project, located in southern Oregon, in a region of unrivaled scenic beauty; of the wonderful progress made in the Boise valley, in Idaho, and the promise of even greater advance as the work of the government nears completion; of the Orland project, in the Sacramento valley, the land of fruits and flowers; of the Rio Grande valley, where there will one day be erected the most stupendous dam in the west—a region in which irrigation began before the Spanish invasion, which will become fruitful and prosperous.

The beacon of hope shines brightly in the west. It beckons the landless man to the manless land.



ALFALFA IS THE FARMER'S BANK ACCOUNT IN THE ARID COUNTRY

ous sales, water rentals, etc., \$1,694,844.77, collections on water rights, \$814,145.34. This does not include any of the moneys collected for the water rights which were due and payable April 1, 1910.

Among the several large projects, one of especial interest is located in northern Wyoming. When the springtime showers and sunshine fall upon the snowy peaks of the lofty mountains on the eastern rim of Yellowstone park a thousand streams will rush downward to fill to brimming the swift-flowing Shoshone river. An important physical change will occur at that time. The flood that once, unchecked and uncontrolled, swept madly through the rock-walled gorge will beat itself to stillness against a massive wall of concrete with which man has blocked the canon. A beautiful lake, 100 feet deep and covering ten square miles, will appear.

In this wonderful gash in the mountains, with perpendicular walls a thousand feet high, the government has erected the highest dam in the world. It is a wedge of concrete 328 feet from base to top. Its height can only be appreciated when compared with that of some well-known structure. New York's famous Flatiron building would not reach within 47 feet of the top of the dam, and the tip-top of the dome of the United States capitol would fall short 21 feet of the parapet.

In the summer, when the crops are thirsty, the big gates will be opened and the pent-up floods will be released into the river below.

Another dam, a low structure of concrete, will divert the waters through a tunnel 3 1/4 miles long into a canal which for 40 miles passes along the upper edge of a broad and fertile valley containing 150,000 acres.

Two years ago it was a desolate waste. Today it contains more than 200 farm houses and three thriving towns. Ten thousand acres produced crops last year on this project. With 16 farm houses along each mile of the main highways, the valley already has a suburban appearance.

More than 250 farm units of 40 to 80 acres each are now available to entry and offer exceptional opportunities for men of moderate means to secure homes in a prosperous and growing country.

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By the matter came to the knowledge of a well-to-do and generous planter who knew Parson J., and who happened to be in Richmond at the time. His indorsement made the checks good and saved the unworthy old parson a deal of trouble.

Bride and Groom. He carries two new grips and two umbrellas. He offers her his arm. She carries nothing but a box of

candy, and invariably wears a small hat, a veil, and a corsage bouquet. He's clean shaven, and wears, besides immaculate linen, a careworn, worried expression.

He pulls out his watch, presumably to see how much of the honeymoon is left.

When he registers at the hotel the "and wife" is written twice as large as his own name.

She never fails to ask how many lumps of sugar he takes in his coffee. Judge.

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Increase the yield—Improve the quality—Enrich the soil. Every harvest proves it. Can you afford to risk your wheat? Be safe.

Armour's Fertilizers grow the biggest crops. Ask your dealer. Armour Fertilizer Works Chicago

USE THE BEST FAULTLESS STARCH FOR LAUNDRY WORK

FOR SHIRTS COLLARS CUFFS AND FINE LINEN

HE LIVED IN THE CITY.



Papa—Why can't we see the moon in the daytime?
Jimmie—'Cause they don't light it up until after dark.

Casey at the Bat.

This famous poem is contained in the Coca-Cola Baseball Record Book for 1910, together with records, schedules for both leagues and other valuable baseball information compiled by authorities. This interesting book sent by the Coca-Cola Co., of Atlanta, Ga., on receipt of 2c stamp for postage. Also copy of their booklet "The Truth About Coca-Cola" which tells all about this delicious beverage and why it is so pure, wholesome and refreshing. Are you ever hot—tired—thirsty? Drink Coca-Cola—it is cooling, relieves fatigue and quenches the thirst. At soda fountains and carbonated in bottles—5c everywhere.

How She Conciliated Them. Filmer—How did it happen that these five men who were so angry with the woman in the nickelodeon for not taking off her hat became so friendly with her afterward?
Screeners—It was raining like fury when the show was over and she invited them to take shelter with her under her hat.

Women in Love. "Women in love are generally troublesome and persecuting." Such is the reported opinion of M. Emile Fauguet. And if a French critic does not understand the subject, of whom shall we seek understanding?

Not an Objection. "I think he'd like to join your club, but his wife wouldn't hear of it."
"She wouldn't hear of it? Why, I know of half a dozen men who would join our club if their wives couldn't hear of it."

It Would Depend. "Would you marry a man who wore side whiskers?"
"I might if I thought it would be worth while to reform him."

Some women are beautiful when they are angry, but generally they are mean and ugly at such times.

Awfully Busy. Jim—A stitch in time saves nine. Tom—Who said that?
Jim—Gee! Ain't you read your Bible?
Tom—Nope; I ain't even had time to read the sporting page this morning yet.—Cleveland Leader.

Different. "Yes, Brown will stick to anything he likes."
"True, but he doesn't like anything he has to stick to."—Puck.

The crumpled horn is one that leaves a headache.

Mrs. Winslow's Soothing Syrup. For children teething, softens the gums, reduces inflammation, allays pain, cures wind colic. 25c a bottle.

Lots of marriages merely demonstrate that misery loves company.

Lewis' Single Binder straight 5c cigar is made to satisfy the smoker.

Mortgage the ship for all it's worth before giving it up.



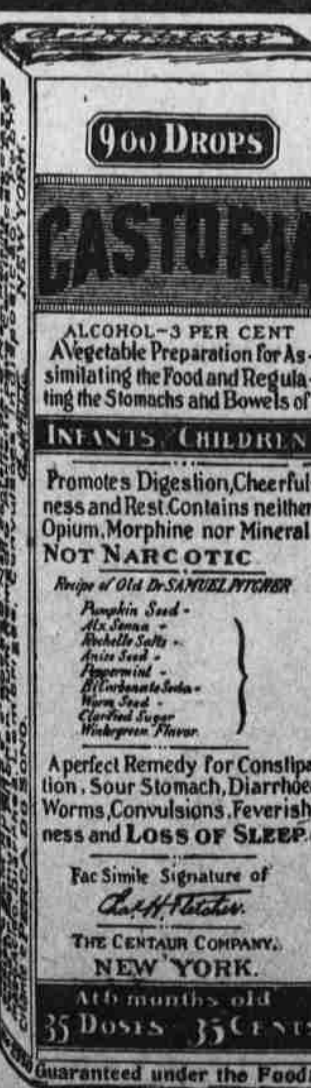
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Thirty Years

CASTORIA

IN THE ANTE-BELLUM DAYS

Supply of Ready Money a Matter of Indifference to Rich and Poor Alike.

According to George Cary Eggleston, Virginians of ante-bellum days showed great indifference in money matters. Money in the form of coin was rarely seen; the planters were in the habit of writing checks on a slip of foolscap, instructing the bank to

"please" pay the amount specified. Eggleston says: "This custom of paying by check so strongly commended itself to a certain unworthy parson of my time that he resorted to it on one occasion in entire ignorance and innocence of the necessity of having a bank deposit as a preliminary to the drawing of checks. He went to Richmond and bought a year's supplies for his little place—it was too small to be

called a plantation—and for each purchase he drew a particularly polite check. When the banks threw these out on the ground that their author had no account the poor old parson found the situation a difficult one to understand. He had thought that the very purpose of a bank's being was to cash checks for persons who happened to be short of money. 'Why, if I had the money in the bank,' he explained, 'I shouldn't have written the checks at all; I should have got the money and paid the bills.' Fortunately

the matter came to the knowledge of a well-to-do and generous planter who knew Parson J., and who happened to be in Richmond at the time. His indorsement made the checks good and saved the unworthy old parson a deal of trouble."

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